one good indicator of a recipient's selfinterest. The requirements are that:

- (1) To the maximum extent practicable, the non-Federal parties carrying out a research project under a TIA are to provide at least half of the costs of the project. Obtaining this cost sharing, to the maximum extent practicable, is a statutory condition for any TIA under the authority of 10 U.S.C. 2371, and is a matter of DoD policy for all other TIAs.
- (2) The parties must provide the cost sharing from non-Federal resources that are available to them unless there is specific authority to use other Federal resources for that purpose (see § 37.530(f)).
- (c) You may consider whether cost sharing is impracticable in a given case, unless there is a non-waivable, statutory requirement for cost sharing that applies to the particular program under which the award is to be made. Before deciding that cost sharing is impracticable, you should carefully consider whether there are other factors that demonstrate the recipient's self-interest in the success of the current project.

# § 37.220 How involved should the Government program official be in the project?

- (a) TIAs are used to carry out cooperative relationships between the Federal Government and the recipient. which requires a greater level of involvement of the Government program official in the execution of the research than the usual oversight of a research grant or procurement contract. For example, program officials will participate in recipients' periodic reviews of research progress and will be substantially involved with the recipients in the resulting revisions of plans for fueffort. That increased programmatic involvement before and during program execution with a TIA can reduce the need for some Federal financial requirements that are problematic for commercial firms.
- (b) Some aspects of their involvement require program officials to have greater knowledge about and participation in business matters that traditionally would be your exclusive responsibility as the agreements officer. TIAs

therefore also require closer cooperation between program officials and you, as the one who decides business matters.

### § 37.225 What judgment must I make about the benefits of using a TIA?

Before deciding that a TIA is appropriate, you also must judge that using a TIA could benefit defense research objectives in ways that likely would not happen if another type of assistance instrument were used (e.g., a cooperative agreement subject to all of the requirements of 32 CFR part 34). You, in conjunction with Government program officials, must consider the questions in paragraphs (a) through (d) of this section, to help identify the benefits that may justify using a TIA and reducing some of the usual requirements. In accordance with §37.1030, you will report your answers to these questions to help the DoD measure the Department-wide benefits of using TIAs and meet requirements to report to the Congress. Note that you must give full concise answers only to questions that relate to the benefits that you perceive for using the TIA, rather than another type of funding instrument, for the particular research project. A simple "no" or "not applicable" is a sufficient response for other questions. The questions are:

- (a) Will the use of a TIA permit the involvement in the research of any commercial firms or business units of firms that would not otherwise participate in the project? If so:
- (1) What are the expected benefits of those firms' or divisions' participation (e.g., is there a specific technology that could be better, more readily available, or less expensive)?
- (2) Why would they not participate if an instrument other than a TIA were used? You should identify specific provisions of the TIA or features of the TIA award process that enable their participation.
- (b) Will the use of a TIA allow the creation of new relationships among participants at the prime or subtier levels, among business units of the same firm, or between non-Federal participants and the Federal Government that will help the DoD get better technology in the future? If so:

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- (1) Why do these new relationships have the potential for helping the DoD get technology in the future that is better, more affordable, or more readily available?
- (2) Are there provisions of the TIA or features of the TIA award process that enable these relationships to form? If so, you should be able to identify specifically what they are. If not, you should be able to explain specifically why you think that the relationships could not be created if an assistance instrument other than a TIA were used.
- (c) Will the use of a TIA allow firms or business units of firms that traditionally accept Government awards to use new business practices in the execution of the research that will help us get better technology, help us get new technology more quickly or less expensively, or facilitate partnering with commercial firms? If so:
- (1) What specific benefits will the DoD potentially get from the use of these new practices? You should be able to explain specifically why you foresee a potential for those benefits.
- (2) Are there provisions of the TIA or features of the TIA award process that enable the use of the new practices? If so, you should be able to identify those provisions or features and explain why you think that the practices could not be used if the award were made using an assistance instrument other than a TIA.
- (d) Are there any other benefits of the use of a TIA that could help the Department of Defense better meet its objectives in carrying out the research project? If so, you should be able to identify specifically what they are, how they can help meet defense objectives, what features of the TIA or award process enable the DoD to realize them, and why the benefits likely would not be realized if an assistance instrument other than a TIA were used.

## § 37.230 May I use a TIA if a participant is to receive fee or profit?

In accordance with 32 CFR 22.205(b), you may not use a TIA if any participant is to receive fee or profit. Note that this policy extends to all performers of the research project carried out under the TIA, including any sub-

awards for substantive program performance, but it does not preclude participants' or subrecipients' payment of reasonable fee or profit when making purchases from suppliers of goods (e.g., supplies and equipment) or services needed to carry out the research.

#### Subpart C—Expenditure-Based and Fixed-Support Technology Investment Agreements

#### § 37.300 What is the difference between an expenditure-based and fixed-support TIA?

The fundamental difference between an expenditure-based and fixed-support TIA is that:

- (a) For an expenditure-based TIA, the amounts of interim payments or the total amount ultimately paid to the recipient are based on the amounts the recipient expends on project costs. If a recipient completes the project specified at the time of award before it expends all of the agreed-upon Federal funding and recipient cost sharing, the Federal Government may recover its share of the unexpended balance of funds or, by mutual agreement with the recipient, amend the agreement to expand the scope of the research project. An expenditure-based TIA therefore is analogous to a cost-type procurement contract or grant.
- (b) For a fixed-support TIA, the amount of assistance established at the time of award is not meant to be adjusted later if the research project is carried out to completion. In that sense, a fixed-support TIA is somewhat analogous to a fixed-price procurement contract (although "price," a concept appropriate to a procurement contract for buying a good or service, is not appropriate for a TIA or other assistance instrument for stimulation or support of a project).

## § 37.305 When may I use a fixed-support TIA?

You may use a fixed-support TIA if:

- (a) The agreement is to support or stimulate research with outcomes that are well defined, observable, and verifiable:
- (b) You can reasonably estimate the resources required to achieve those